

SL-1 NC141/1

Time: 08:00 a.m. CDT, 9:19:30 GET

5/24/73

PAO Good morning, this is Skylab Control at 1300 hours Greenwich mean time, 8:00 a.m. central daylight time, May 24. Skylab space station at this time is in contact with the Honeysuckle tracking site. Since our last reporting period the average temperatures internally have remained fairly stable at the 126 degree level, that's Fahrenheit. The attitude of the spacecraft at this time is wings level flying in plane pitched up 47 degrees. An attitude which the flight controllers at the Johnson Space Center, where the mission is presently under control, feel is the best attitude for thermal management of the orbital workshop. In addition to thermal management, there has been an active effort over the past 24 hours to maintain OWS depressurization in venting for outgassing management. In a word Skylab space station is in approximately the same condition that it was when we last reported to you on May 23. At 13 hours 2 minutes and 35 seconds Zulu time, this is Skylab Control.

END OF TAPE

SL-1 MC-142/1

Time: 10:10 a.m. CDT, 09:21:40 GMT

9/24/73

PAO This is Skylab Control; 1500 hours
10 minutes Greenwich mean time, nearing the end of the 143rd
revolution. Skylab space station is crossing the tip of
Baja, California, at this time, with orbital parameters of
239.4 nautical miles by 234.3 nautical miles. The spacecraft
is traveling at a speed of 25,089 feet per second, and at this
speed it takes 1 hour 33 minutes and 13 seconds to complete a
revolution. The spacecraft is under control of the Texas
station and the flight controllers here report that all of the
thermal parameters have not changed significantly, and that
spacecraft attitude is the same as previously mentioned. At
15 hours 12 minutes Zulu time, this is Skylab Control.

END OF TAPE

SL-1 MC-143/1

Time: 11:00 a.m. CDT, 09:22:30 GET

5/24/73

PAO This is Skylab Control at 1600 hours Greenwich mean time. During the past hour we had a relatively quiet pass over the continental United States. The Skylab space station at this time is out over the eastern - southeastern tip of Africa. We're approximately 15 minutes from acquisition of signal again, and at that time, it will be the Honeysuckle station that will acquire the spacecraft. At 16 hours 1 minute Greenwich mean time, this is Skylab Control.

END OF TAPE

SL-1 NC144/1

Time: 11:16 a.m. CDT, 09:22:46 GET

5/24, 73

PAO This is Skylab Control at 16 hours 16 minutes Greenwich mean time with an announcement that there is to be a pre-mission press conference starting at 1:00 p.m. central daylight time. The press conference will emanate from KSC, the Kennedy Space Center, and from the Johnson Space Center jointly. The principal participant at the Kennedy Space Center will be Mr. William Schneider, Skylab Program Director, from NASA Headquarters. And at the Johnson Space Center, Mr. Kenneth Kleinknecht, Skylab Program Director at JSC, and Glynn Lunney, who is the manager of Apollo Spacecraft Program. A question and answer capability between the Kennedy Center and Johnson Center will be available for those press. At 16 hours 18 minutes Greenwich mean time, this is Skylab Control.

END OF TAPE

SL-1 MC-143/1

Time 12:00 Noon CDT, 09:24:30 GDT

5/24/73

PAO This is Skylab Control at 1700 hours Greenwich mean time. Skylab space station this time is over the New England states starting revolution 143. Within the past hour the Eastern Test Range clock has been activated at Mission Control Center and is counting down. At this time the clock reads 18 hours 29 minutes and 14 seconds, excluding programmed or builtin holds, from the lift-off of Skylab 2. There will be a premission press conference starting at 1 p.m. central daylight time emanating from the Kennedy Space Center and from the Johnson Space Center. Main participants include William Schneider, Skylab Program Director from NASA Washington who will head the group at the Cape and at the Johnson Space Center, Mr. Kenneth Kleinknecht who is the Skylab Program Director here at JSC will head the group of participants. That press conference is scheduled to start at 1 p.m. central daylight time with the capability for questions and answers two ways. At 17 hours 2 minutes this is Skylab Control.

END OF TAPE

SL-1 NC-146/1

Time: 15:01 p.m. CDT, 10:02:31 CET
5/24/75

PAO This is Skylab Control at 20 hours 1 minute 3 seconds Greenwich mean time. Flight Director Donald Puddy is preparing to begin a repetition of attitude maneuvers performed yesterday to adjust temperatures in the two areas of prime concern, the orbital workshop habitation area and the coolant loop inlet that feeds the suit umbilical system. This attitude maneuver sequence, now dubbed the sun habitation area reset maneuver, shifts the space station from its electrical power thermal baseline at 50 degrees pitched up, to a 68 degrees pitch up for two revolutions, down to 45 degrees for 5 revolutions and increase electrical power and then return to baseline at 50 degrees. In this case flight controllers may choose to stay at 45 degree pitchup to provide full electrical power without decreasing temperatures in the suit umbilical coolant loop. The coolant loop which can be heated by maneuvers at high pitch angles, 65 degrees to 70 degrees pitchup, cools below desired levels during long periods at 50 degrees. It may also be warmed by pitch angles below 50 degrees. During the past night, temperatures in the suit umbilical system coolant loop dropped from 34.9 degrees Fahrenheit to 34.7 degrees, the suggested line, over a 14 hour period. Then 34.5 degrees in the following 14 hours. It has just reached 34.2 degrees in the past hour in the suit umbilical coolant loop. In advance of this suit umbilical system habitation reset maneuver which is expected to take place in about 2 hours, the spacecraft is being pitched down to 45 degrees to increase electrical power levels in the 18 batteries feed by the Apollo telescope mount solar array. This maneuver is now being commanded over U.S. tracking stations. The spacecraft is now in range of the Goldstone tracking station. There is a press conference, Change of Shift Briefing, scheduled for approximately 5 o'clock with Donald Puddy, the outgoing flight director. This is Skylab Control at 3 minutes and 20 seconds after the hour.

END OF TAPE

SL-1 MC-147/1

Time: 16:00 CDT 10:03:30 GRT

5/24/73

PAO

This is Skylab Control at 21 hours Greenwich mean time. At the present time the spacecraft is on revolution 147, beginning its ascending node, just about to approach Australia. We have been informed by the Guidance and Navigation Systems Officer of the location of the orbital workshop, tomorrow at launch time. At the time of launch, 13 hours Greenwich mean time the spacecraft will be located 36 degrees, 38 minutes, 12 seconds, north and 67 degrees, 13 minutes, 44 seconds, west. To repeat that is 36 degrees, 38 minutes, 12 seconds, north and 67 degrees, 13 minutes, 44 seconds, west. That will place the spacecraft approximately 300 miles east of Philadelphia over the Atlantic Ocean. This is at the time of launch, 13 hours Greenwich mean time tomorrow. At the present time the Flight Director is Milton Windler, having just taken over from Don Puddy, who is remaining on duty in preparation for a major attitude maneuver over Vanguard tracking station. The Vanguard station is aboard a ship in the Atlantic Ocean and that will not take place for some time yet, so that Don Puddy expects to remain on duty until some time after 5:00 central daylight time. There will be a press conference held immediately after that, shortly after 5:00 central daylight time. This is Skylab Control at 1 minute and 38 seconds after the hour.

END OF TAPE

SL-1 MC-148/1

Time: 16:10 CDT 10:03:39 GET

5/24/79

PAO

This is Skylab launch control.

Preparations at launch complex 39 are underway right now to move the mobile service structure from Pad B to its park site. Mobile service structure affords access to the space vehicle, and also gives environmental protection to the spacecraft during the pad checkout period. It's moved to its park site prior to loading liquid oxygen and liquid hydrogen. Those are the cryogenic fuels for the first and second stage of the Saturn 1-B. (garble) Cryogenic fueling has been moved ahead in the countdown. It's now scheduled to begin about 9:30 p.m. That's eastern daylight time. If all goes well, the fueling should be finished about 12:30. And closeout crew will enter the pad and complete stowage. All tasks, at this time, in the count are going well and it's expected at this time the cryogenic loading will begin on schedule.

END OF TAPE

SL-II MC-149

Time: 16:36 CDT 10:04:05 GMT

5/24/73

PAO

This is a statement from William Schneider, Skylab Program Manager. "As a result of further technical discussions and analysis, we have concluded to continue preparations for the Skylab 2 mission with the Skylab parasol as the prime means of providing the thermal shield. The twin parasol shield will continue as the alternate and we will carry the SEVA sail as a third possibility. However, present tests indicate that there could be some physical deterioration of the parasol material. Our current planning is to jettison that device if it becomes necessary during the mission and subsequently deploy the twin pole shield prior to the end of the 28 day first mission. Testing of the parasol material will continue, and afford us real time indication on the ground of the the inflight status. In addition, we will continue to monitor the onboard instruments which monitor the external conditions of the shield in order to assist our real time decision." That concludes the statement.

END OF TAPE

SL-II MC-150/1

Time: 17:00 CDT 10:04:30 GET

5/24/73

PAO This is Skylab Control at 22 hours Greenwich mean time. At the present time there are still considerations being undertaken here in Mission Control with Flight Director Milton Windler on possible changes in attitude to correct temperature deviations in that SUS loop. The suit umbilical system coolant loop is now recording 34.0 degrees Fahrenheit, that's a drop of 0.2 of a degree over the last 4 hours. There is some concern that this temperature is now down to an area that was previously identified as a blue line, or a low point that they wanted to try and stay above. They were setting an optimum level at the time of 34.7. So, with this temperature decrease they have been undertaking attitude maneuvers to bring about an increase in that temperature and there should be some changes made in the next 2 hours that will bring that temperature back up again. Don Puddy, the offgoing Flight Director is still in Mission Control and we will announce his departure when he leaves the Mission Control for a change of shift briefing, approximately in the next 15 minutes. This is Skylab Control Houston at 1 minute and 5 seconds, after the hour.

END OF TAPE

SL-11MC-191/1

Time: 17:15 CDT 22:15:00 GET

5/24/73

PAO This is Skylab Control at 22 hours
15 minutes and 4 seconds Greenwich mean time. Offgoing
Flight Director Donald Puddy has left Mission Control
and is on his way now to a briefing at - in the small
briefing room in Building 1 at Johnson Space Center. He
should be there within 5 minutes. This is Skylab Control
at 15 minutes and 22 seconds after the hour.

END OF TAPE

SL-2 MC-152/1

Time: 18:06 CDT 144:23:07 CDT

5/24/73

PAO This is the Skylab News Center. The countdown for launch of Skylab 2 continues at the Kennedy Space Center's launch complex 39. The count now stands at T minus 9 hours 23 minutes and counting. The move of the mobile service structure from pad B back ... began at 6:26 p.m. eastern daylight time. Move of the mobile service structure was delayed approximately 54 minutes by thunderstorm activity in the pad area. The mobile launcher at the pad sustained one and perhaps two lightning strokes. But early indications are that the Skylab 2 space vehicle sustained no damage. Both the launch vehicle and spacecraft will be retested extensively during the evening. At this time there appears to be no impact upon an on-time launch at 9:00 a.m. eastern daylight time on Friday morning. Preparations are to get underway at 7:30 p.m. to load liquid oxygen aboard the S1B booster and liquid oxygen and liquid hydrogen aboard the S4B second stage later this evening. This is the Skylab News Center.

END OF TAPE

SL-1 MC-153/1

Time: 19:00 CDT 143:00:00 GCT

3/24/73

PAO

This is Skylab Control at 0 hours GMT.

The Skylab space station is now in its 149 revolution, midway through the night time part of its orbit above the Earth. The spacecraft will continue a 60 degree pitched up attitude for one additional daylight pass ending at Vanguard. Then at about 1:19 Greenwich mean time or 8:19 p.m. central daylight time, commands will be sent to return the spacecraft to a lower pitch, 45 degrees up, so that batteries can be recharged by the Apollo telescope mount solar cells. The pitched up attitude is already brought some temperatures down in the workshop area where film and food are stored. Floor level food storage areas are now estimated to be at 121 degrees, while wall areas are estimated at 127.5 degrees. Of the 25 atmospheric gas temperature transducers recorded on Mission Control Displays, 12 continue to read off-scale high or above 120 degrees. Other readings vary from 55.9 in the multiple docking adaptor to 116.6 on the experimental compartment ceiling. The suit umbilical system coolant loop aluminum tubing filled with water is still recording 34.0 degrees Fahrenheit. A temperature increase is expected during the coming night as a result of the SLS habitation area reset attitude maneuver now under way. A fluctuation in the output of charger battery regulator module number 17, that's CBRM number 17, which indicated an electrical output of about one-half the normal level then accelerated to more than normal output has now stopped. This charger battery regulator module is now producing at a normal level, and is expected to cause no further problems. This is Skylab Control at 2 minutes after the hour.

END OF TAPE

SL-1 NC-154/1
Time: 19:14 CDT
5/24/73

PAO This is the Skylab News Center. The countdown for launch of Skylab 2 continues at launch complex 39 at the Kennedy Space Center. The count now stands at T minus 8 hours 31 minutes. The Control Tower at the Cape Kennedy skid strip has confirmed the touchdown of a T-38 bringing the SEVA sail from the Johnson Space Center, in Houston, Texas at 7:55 - 8:00 p.m. eastern daylight time. That time again is 7:58 p.m. eastern daylight time. At complex 39 pad B has been cleared in preparation for loading liquid oxygen aboard the S1B booster and liquid oxygen and liquid hydrogen aboard the S4B second stage beginning at 9:45 p.m. A closer evaluation of the lightning activity at pad B at 5:24 p.m. indicates that the mobile service structure and not the mobile launcher was hit by a lightning stroke. Retest of both the spacecraft and launch vehicle is proceeding and indications are that the Skylab 2 space vehicle sustained no damage. Retesting is to continue during the evening. At this time there appears to be no impact upon an on-time launch at 9:00 a.m. eastern daylight time Friday morning. A Lear jet with the Skylab parasol aboard has left the Johnson Space Center en route here and has an estimated time of arrival of 9:00 p.m. eastern daylight time. This is the Skylab News Center.

END OF TAPE

SL-1 NC-155/1

Time: 20:22 CDT 143:01:21 GMT

9/24/73

PAO This is the Skylab News Center, count-down for the launch of Skylab 2 continues at the Kennedy Space Center launch complex 39. The preparation for loading of cryogenic propellants aboard the Saturn 1-B is scheduled to begin at 9:45 p.m. eastern daylight time. The count is now at T minus 7 hours 23 minutes and counting. The Skylab parasol arrived at the ... airport aboard a Lear jet from the Johnson Space Center in Houston, Texas, at 8:30 p.m. It has been taken to the Kennedy Space Center in preparation for stowage aboard the spacecraft. The SEVA sail arrived at the Cape Kennedy skid strip at 7:58 p.m. aboard a T-38 jet. It too, is at the space center awaiting spacecraft stowage. A retest of the space vehicle following a lightning stroke on the mobile service structure at 5:24 p. m. eastern daylight time is nearing completion. Test data shows no damage to either the launch vehicle or the spacecraft. At this time, preparations are proceeding for launch of Skylab 2 at 9:00 a. m. eastern daylight time on Friday morning. This is Skylab news center.

END OF TAPE

SL-1 MC-156/1

Time: 21:09 CDT 145:02:08 GMT

5/24/73

PAO This is the Skylab News Center. The countdown for the launch of Skylab 2 at 9:00 a.m. eastern daylight time Friday, continues at the Kennedy Space Center. We are now at T minus 9 hours 36 minutes and counting. Complex 39 pad B has been cleared and loading of cryogenic propellants aboard the Saturn 1B launch vehicle is now in progress. This procedure calls for loading liquid oxygen first aboard the S1B booster and then aboard the S4B second stage. At the conclusion of LOX loading, liquid hydrogen will be tanked aboard the second stage. The SEVA sail and Skylab parasol have been received from the Johnson Space Center in Houston, Texas and the stowage aboard the spacecraft should begin at approximately 1:30 a.m. Friday morning at the conclusion of cryogenic loading. Weather conditions continue to appear favorable for launch on Friday morning. The early evening thunderstorms over northern and central Florida should dissipate during the night. At launch time tomorrow we should have fair to partly cloudy skies with southwest winds around 10 miles per hour. Visibility should be about 8 miles. Temperature should be near 78 degrees. Weather over the northern Atlantic beneath Skylab 2's orbital pass is not of any particular concern. This is the Skylab News Center.

END OF TAPE

SL-1, MC-157/1

Time: 22:03 CDT 143:03:04

5/24/73

PAO This is the Skylab News Center. The
countdown for the launch of Skylab 2 at 9:00 a. m. eastern
daylight time Friday, continues on time at Kennedy Space
Center. The loading of cryogenics continues, and is
expected to be completed at 1:00 a. m. Stowage of the
SEVA sail and the parasol should begin about 1:30. Weather
conditions continue to be favorable for launch on Friday
morning.

END OF TAPE